

PT Novel anti-microbial protein from e.g. Macadamia integrifolia -
 PT useful for controlling microbial infestations of plants or mammals
 XX
 PS Claim 1; Page 39-41; 96pp; English.
 XX The sequence is that of an antimicrobial protein which can
 CC be used to control microbial infestations in plants and mammalian
 XX animals.
 SQ Sequence 666 AA:

Query Match 100.0%; Score 384; DB 19; Length 666;
 Best Local Similarity 100.0%; Pred. No. 5. 1e-31; Mismatches 0; Indels 0; Gaps 0;
 Matches 69; Conservative 0; Mismatches 0;

Qy 1 NRQRDQQYBQCBERCQHETEPRHMTCQRCRERRYEKRRKQKRVEQQRDEEKY 60
 Db 117 nrqrpbqqyeqcqcrqgrheteprhmqtccgrrcerryekrkrqkryeeqqredeeky 176
 Qy 61 ERMKEEDN 69
 Db 177 eermkeedn 185

RESULT 2
 W62828 W62828 standard; Protein; 666 AA.

AC W62828;
 XX
 DT 27-OCT-1998 (first entry)
 DE Macadamia integrifolia antimicrobial protein.
 KW antimicrobial protein; infestation; control.
 OS Macadamia integrifolia.
 XX
 FH Key Location/Qualifiers
 Peptide 1..28
 DE Macadamia integrifolia antimicrobial protein.
 KW antimicrobial protein; infestation; control.
 OS Macadamia integrifolia.
 XX
 PH Key Location/Qualifiers
 Peptide 1..28
 FT Protein /note= "signal peptide"
 FT Protein 29..666 /note= "mature protein"
 XX
 PR 20-DEC-1996; 96AU-0004275.
 PA (RETR-) COOP RES CENT TROPICAL PLANT PATHOLOGY.
 XX
 PI Bower NI, Goulter KC, Green JL, Manners JM, Marcus JP;
 DR WPI; 1998-37279/32.
 DR N-PSDB; V42316.
 XX
 PT Novel anti-microbial protein from e.g. Macadamia integrifolia -
 PT useful for controlling microbial infestations of plants or mammals
 XX
 PS Claim 1; Page 43-45; 96pp; English.
 XX The sequence is that of an antimicrobial protein which can
 CC be used to control microbial infestations in plants and mammalian
 XX animals.
 SQ Sequence 625 AA;

Query Match 93.5%; Score 359; DB 19; Length 625;
 Best Local Similarity 94.2%; Pred. No. 1. 5e-28; Mismatches 3; Indels 0; Gaps 0;
 Matches 65; Conservative 1; Mismatches 3;

Qy 1 NRQRDQQYBQCBERCQHETEPRHMTCQRCRERRYEKRRKQKRVEQQRDEEKY 60
 Db 76 nrqrpbqqyeqcqcrqgrheteprhmqtccgrrcerryekrkrqkryeeqqredeeky 135
 Qy 61 ERMKEEDN 69
 Db 136 eermkeedn 144

Query Match

95.6%; Score 367; DB 19; Length 666;

RESULT 4

W62831
 ID W62831 standard; Protein; 525 AA.
 XX
 AC W62831;
 XX
 DT 27-OCT-1998 (first entry)
 DE Theobroma cacao antimicrobial protein.
 KW antimicrobial protein; infestation; control.
 OS Theobroma cacao.
 XX
 PN WO9827805-A1.
 XX
 PD 02-JUL-1998.
 PT 23-DEC-1997; 97WO-AU00874.
 PR 20-DEC-1996; 96AU-0004275.
 PA (RETR-) COOP RES CENT TROPICAL PLANT PATHOLOGY.
 PI Bower NI, Goulter KC, Green JL, Manners JM, Marcus JP;
 XX
 DR WPI; 1998-377279/32.
 XX
 PT Novel anti-microbial protein from e.g. Macadamia integrifolia - useful for controlling microbial infestations of plants or mammals
 XX
 PS Claim 1; Page 47-49; 96pp; English.
 CC The sequence is that of an antimicrobial protein which can be used to control microbial infestations in plants and mammalian animals.
 CC
 XX
 SQ Sequence 525 AA:

Query Match 45.6%; Score 175; DB 19; Length 525;
 Best Local Similarity 32.4%; Pred. No. 3.4e-10; Indels 36; Gaps 2;
 Matches 33; Conservative 19; Mismatches 14; PT 27-OCT-1998 (first entry)
 DE Gossypium hirsutum antimicrobial protein.
 KW antimicrobial protein; infestation; control.
 OS Gossypium hirsutum.
 XX
 PN WO9827805-A1.
 XX
 PD 02-JUL-1998.
 PT 22-DEC-1997; 97WO-AU00874.
 PR 20-DEC-1996; 96AU-0004275.
 PA (RETR-) COOP RES CENT TROPICAL PLANT PATHOLOGY.
 PI Bower NI, Goulter KC, Green JL, Manners JM, Marcus JP;
 XX
 DR WPI; 1998-377279/32.
 XX
 PT Novel anti-microbial protein from e.g. Macadamia integrifolia - useful for controlling microbial infestations of plants or mammals
 XX
 PS Claim 1; Page 49-51; 96pp; English.
 CC The sequence is that of an antimicrobial protein which can

XX
 (MRSC) MARS UK LTD.
 PA
 XX
 PI Spencer ME, Hodge R, Deakin EA, Ashton S;
 XX
 DR WPI; 1992-024418/03.
 XX
 PT N-PSDB; Q20377.
 PT Recombinant cocoa proteins - are responsible for flavour in cocoa beans and produced in large quantities using yeast and bacterial expression vectors
 XX
 PS Claim 4; Fig 2; 59pp; English.
 XX
 CC The inventors claim a 67 kD and 31 kD T. cacao protein, and fragments, and encoding DNAs. The 47 kD and 31 kD proteins are derived from the 67 kD precursor. T. cacao protein cDNA was detected in a cDNA library prepared from immature cocoa beans RNA using a probe based on the AA sequence of a C18R peptide common to the 47 kD and 31 kD polypeptides. Homology searches revealed close homologies between the 67 kD polypeptide and the vicilins, which are seed storage proteins.
 XX
 CC Sequence 566 AA:
 XX
 PT Query Match 45.6%; Score 175; DB 13; Length 566;
 Best Local Similarity 32.4%; Pred. No. 3.7e-10; Indels 36; Gaps 2;
 Matches 33; Conservative 19; Mismatches 14; PT 27-OCT-1998 (first entry)
 DE Gossypium hirsutum antimicrobial protein.
 KW antimicrobial protein; infestation; control.
 OS Gossypium hirsutum.
 XX
 PN WO9827805-A1.
 XX
 PD 02-JUL-1998.
 PT 22-DEC-1997; 97WO-AU00874.
 PR 20-DEC-1996; 96AU-0004275.
 PA (RETR-) COOP RES CENT TROPICAL PLANT PATHOLOGY.
 PI Bower NI, Goulter KC, Green JL, Manners JM, Marcus JP;
 XX
 DR WPI; 1998-377279/32.
 XX
 PT Novel anti-microbial protein from e.g. Macadamia integrifolia - useful for controlling microbial infestations of plants or mammals
 XX
 PS Claim 1; Page 49-51; 96pp; English.
 CC The sequence is that of an antimicrobial protein which can

Query Match	38.8%	Score 149; DB 19;	Length 590;
Best Local Similarity	33.3%	Pred. No. 1; 6e-07;	
Matches	31;	Conservative	19;
	Mismatches	16;	Indels 28;
	Gaps	3;	
Dy	1	NRQRDQQQVQECQCRCRHTPEPRIMOTCQCRCERVEK-----	53
Dy	78	hrpdpgrryeccgdec--qgeerqgpqqgrclrkfedeqqsgqrqfdecqgqhcqge	135
Dy	54	-REDEEKY-----EERMKEED 68	
Dy	136	qrppekkqgcvrecryqenpprgereeeeee 169	
Db	528	regeerreqrikrge 542	
Sequence	590 AA;		
RESULT	7		
ID	Y30795	standard; Protein; 1898 AA.	
DE	Y30795;		
DE	25 - NOV - 1999	(first entry)	
DE	A human trichohyalin (TRHY) protein.		
DE	Human: trichohyalin; TRHY; protein; tissue structure; wound healing;		
DE	terminally differentiating epidermal tissue; proteinaceous gel;		
DE	breast implant.		
KW	Homo sapiens.		
KW	OS	Human herpesvirus type 8.	
KW	XX		
AC	US5958752-A.		
AC	28 - SEP - 1999.		
AC	14 - FEB - 1997;	97US-0800644.	
AC	30 - APR - 1993;	93US-0056200.	
AC	(USSH) US DEPT HEALTH & HUMAN SERVICES.		
AC	Kim I., Chung S., Park S., Steinert PM, Lee S;		
AC	WPI: 1999-561041/47.		
AC	N-PSDB; Z22301.		
AC	Human trichohyalin useful for forming a proteinaceous gel that promotes		
AC	wound healing -		
AC	Disclosure: Fig 3A-W; 126pp; English.		
CC	The present sequence represents a human trichohyalin (TRHY) protein.		
CC	The protein is found in terminally differentiating epidermal tissue,		
CC	and is involved in forming the structural architecture of such		
CC	tissue. The trichohyalin protein is useful for forming a		
CC	proteinaceous gel which may then be used for healing wounds, or in		
CC	breast implants.		
CC	sequence 1898 AA;		
CC	Query Match	29.4%	Score 113; DB 20;
CC	Best Local Similarity	33.3%	Length 1898;
CC	Matches	25;	Conservative
CC		Mismatches	20;
CC		Indels	8;
CC		Gaps	2;
CC	Sequence	1162 AA;	
CC	Query Match	28.9%	Score 111; DB 21;
CC	Best Local Similarity	31.3%	Length 1162;
CC	Matches	21;	Conservative
CC		Mismatches	20;
CC		Indels	0;
CC		Gaps	0;
CC	Sequence	1162 AA;	
Qy	54	REDEEKY-EERMKEED 68	
Qy	: : ! : :		
Db	528	regeerreqrikrge 542	
RESULT	8		
ID	Y58500		
ID	Y58500	standard; Protein; 1162 AA.	
ID	XX		
AC	Y58500;		
AC	XX		
DT	10 - APR - 2000	(first entry)	
DE	HHV8 ORF 73 protein, SEQ ID NO:21.		
DE	XX		
KW	HHV8; detection; diagnosis; Kaposi's sarcoma; AIDS; immunogen;		
KW	antigen.		
XX	OS		
XX	Human herpesvirus type 8.		
XX	FH		
FT	Key	Location/Qualifiers	
FT	Misc-difference	96	/label= unknown
XX	PN	W09961909-A2.	
XX	PD	02-DEC-1999.	
XX	PF	26-MAY-1999;	99WO-US11407.
XX	PR	26-MAY-1998;	99US-0086695.
XX	PA	(USSH) US DEPT HEALTH & HUMAN SERVICES.	
XX	PT	pau CP;	
XX	DR	WPI; 2000-097142/08.	
PT	New methods and compositions for the detection of human herpesvirus -		
PS	XX		
PS	Claim 2; Page 59-62; 68pp; English.		
XX	CC	Sequences Y58480-Y58532 represent immunogenic polypeptides derived from	
CC	CC	human herpes virus type 8 (HHV8), a gammaherpesvirus. HHV8 plays an	
CC	CC	important role in the pathogenesis of AIDS-related Kaposi's sarcoma. The	
CC	CC	invention relates to a novel method of detecting the presence of human	
CC	CC	herpesvirus 8 in a biological sample using peptides representative of	
CC	CC	dominant antigenic regions of HHV8. The method comprises contacting one	
CC	CC	or more isolated, immunogenic HHV8 peptides with an antibody-containing	
CC	CC	biological sample, and detecting the formation of a complex between the	
CC	CC	peptide and the antibody. The presence of a peptide-antibody complex	
CC	CC	indicates the presence of human herpesvirus 8. The detection of HHV8	
CC	CC	infection can be used to diagnose AIDS-associated Kaposi's sarcoma. The	
CC	CC	HHV8-specific antibodies are useful therapeutically when for the passive	
CC	CC	immunisation of a human against HHV8 infection, thereby reducing HHV8	
CC	CC	related disease. The detection assays are highly specific, sensitive and	
CC	CC	accurate. Early detection and treatment of Kaposi's sarcoma could	
CC	CC	diminish the severity of symptoms related to AIDS and the sensitive	
CC	CC	techniques could reduce erroneous characterisations of skin disorders.	
CC	CC	Previous assays for HHV8 antibodies such as immunofluorescence assays,	
CC	CC	immunooblots and enzyme immunoassays lack the sensitivity and accuracy	
CC	CC	of the assays are that reproducible results are obtained and the method	
CC	CC	is suitable for rapid throughput and screening of samples economically.	
XX	SQ	Sequence 1162 AA;	

KW immunogenic protein; Toxoplasma gondii protein; oocyst shedding; cat;
 KW T. gondii infection; enteric apicomplexa oocyst; Cryptosporidium oocyst;
 XX Toxoplasma oocyst.
 OS Toxoplasma gondii.
 XX WO9932633-A1.
 XX 01-JUL-1999.
 XX 18-DEC-1998; 98WO-US27137.
 XX 19-DEC-1997; 97US-0994825.
 PA (HESK-) HESKA CORP.
 PI Lutz SB, Milhausen MJ, Ng RK;
 XX DR WPI; 1999-418930/35.
 XX N-PADB; X01242.
 PT New isolated Toxoplasma gondii nucleic acids used, e.g. to treat
 XX infection caused by this microorganism.
 PS Claim 29: Page 227-229; 381pp; English.
 XX The invention provides isolated Toxoplasma gondii nucleic acids that
 CC encode immunogenic polypeptides. The T. gondii nucleic acid molecules,
 CC immunogenic proteins and antibodies to the proteins can be used to
 CC inhibit T. gondii oocyst shedding in a cat due to infection with
 CC T. gondii. They can be used for preventing T. gondii infection and for
 CC preventing the spread of T. gondii infection. They can also be used to detect
 CC parasite cysts or oocysts in feces, e.g. from enteric apicomplexa oocysts
 CC such as Cryptosporidium oocysts and Toxoplasma oocysts.
 XX
 SQ Sequence 611 AA:
 Query Match 26.7%; Score 102.5; DB 20; Length 611;
 Best Local Similarity 30.0%; Pred. No. 0.0073;
 Matches 21; Conservative 22; Mismatches 24; Indels 3; Gaps 1;
 Qy 2 RQRDPDQQYPOCQEERCORHETEPRMQTCQRCRBERYEKEKRKQOKRYEQ--QREDEE 58
 Db 344 reederrerrrrveekargqeeeeeerrrrveekargqeeeee 403
 Qy 59 KYEEEMKEED 68
 Db 404 ererrrveee 413
 RESULT 12
 ID Y68784
 Y68784 standard; Protein; 1135 AA.
 AC Y68784;
 DT 16-MAY-2000 (first entry)
 XX Amino acid sequence of a human phosphorylation effector PHSP-16.
 XX Human: phosphorylation effector; PHSP; proliferative disorder;
 KW immune disorder; neuronal disorder.
 XX Homo sapiens.
 XX
 Key Location/Qualifiers
 FT Modified-site 9 /note= "potential phosphorylation site"
 FT Modified-site 17 /note= "potential phosphorylation site"
 FT Region 31..54 /note= "potential phosphorylation site"
 FT
 FT Modified-site 33 /note= "protein kinase signature sequence"
 FT Modified-site 53 /note= "Potential glycosylation site"
 FT Modified-site 59 /note= "potential phosphorylation site"
 FT Modified-site 59 /note= "potential phosphorylation site"
 FT Modified-site 77 /note= "potential phosphorylation site"
 FT Modified-site 112 /note= "potential phosphorylation site"
 FT Modified-site 124 /note= "potential phosphorylation site"
 FT Modified-site 129..182 /note= "potential phosphorylation site"
 FT Modified-site 149..161 /note= "protein kinase signature sequence"
 FT Region 187 /note= "protein kinase signature sequence"
 FT Region 214..236 /note= "tyrosine kinase catalytic site"
 FT Active-site 222 /note= "lysine kinase catalytic site"
 FT Modified-site 255 /note= "potential phosphorylation site"
 FT Modified-site 259 /note= "potential phosphorylation site"
 FT Modified-site 264 /note= "potential phosphorylation site"
 FT Modified-site 309 /note= "potential phosphorylation site"
 FT Modified-site 319 /note= "potential phosphorylation site"
 FT Modified-site 321 /note= "potential phosphorylation site"
 FT Modified-site 323 /note= "potential phosphorylation site"
 FT Modified-site 324 /note= "potential phosphorylation site"
 FT Modified-site 326 /note= "potential phosphorylation site"
 FT Modified-site 351 /note= "potential phosphorylation site"
 FT Modified-site 467 /note= "potential phosphorylation site"
 FT Modified-site 543 /note= "potential phosphorylation site"
 FT Modified-site 550 /note= "potential phosphorylation site"
 FT Modified-site 554 /note= "potential phosphorylation site"
 FT Modified-site 570 /note= "potential phosphorylation site"
 FT Modified-site 572 /note= "potential phosphorylation site"
 FT Modified-site 594 /note= "potential phosphorylation site"
 FT Modified-site 624 /note= "potential phosphorylation site"
 FT Modified-site 625 /note= "potential phosphorylation site"
 FT Modified-site 632 /note= "potential phosphorylation site"
 FT Modified-site 681 /note= "potential phosphorylation site"
 FT Modified-site 682 /note= "potential phosphorylation site"
 FT Modified-site 688 /note= "potential phosphorylation site"
 FT Modified-site 689 /note= "potential phosphorylation site"
 FT Modified-site 705 /note= "potential phosphorylation site"
 FT
 FT Modified-site 688 /note= "potential phosphorylation site"
 FT Modified-site 689 /note= "potential phosphorylation site"
 FT Modified-site 705 /note= "potential phosphorylation site"

PT Novel kinase-related polypeptides used for the diagnosis and treatment
 PT of kinases-related diseases and disorders
 XX

PS Claim 11: Page 274-278: 387pp; English.

XX This sequence represents a novel STE20-related protein kinase. The invention relates to nucleic acid molecule encoding a kinase polypeptide selected from STILK2, STILK3, STILK4, STILK5, STILK6, STILK7, ZCL, ZC1, ZC2, ZC3, ZC4, KHS2, SULU1, SULU3, GEF2, PAK4 and PARK5. The proteins are used to identify agonists and antagonists, and to raise antibodies. The polynucleotides are useful in gene therapy protocols. The polynucleotides, polypeptides, antibodies, antagonists and agonists may be used to treat diseases such as immune-related disorders and diseases (e.g. rheumatoid arthritis, atherosclerosis, chronic inflammatory bowel disease (e.g. Crohn's disease), asthma, osteoarthritis, psoriasis, atherosclerosis, rhinitis, autoimmunity, and organ transplantation, chronic inflammatory pelvic disease, multiple sclerosis, organ transplantation, myocardial infarction, cardiovascular disease, stroke, renal failure, oxidative stress-related neurodegenerative disorders (e.g. amyotrophic lateral sclerosis, parkinson's disease and leigh syndrome), cancer, cardiomyopathies, ischemic disorders, inflammatory disorders, diabetes mellitus, fibrotic and mesangial disorders. The proteins may also be useful for cell growth regulation (e.g. in wound healing), T cell activation, mitosis control, and as immunosuppressants.

CC Sequence 1297 AA;

CC SQ 25.7%; Score 98.5%; DB 20; Length 1297;

Best Local Similarity 31.28; Pred. No. 0.041; Mismatches 22; Indels 11; Gaps 3;

Query	1 NRQDPD--QQQEQQCOPRCORI-----EPRPRHMOTCQQRCCRERYKEKKRQQKRYEE 51
Db	327 nkversaarrqgleqqgqrenneehkrqlaerqkrlkeeqkqr---rleeqgrrekrirkq 384
Query	52 QDREDEEKYEEERKKEED 68
Db	385 qereqrrhyeeqmrree 401

Search completed: March 1, 2001, 15:47:09
 Job time: 234 sec

